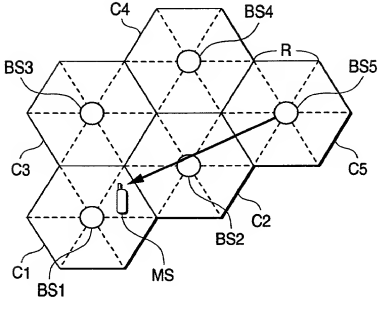
FIG. 1



US2007/0202810

FIG. 2

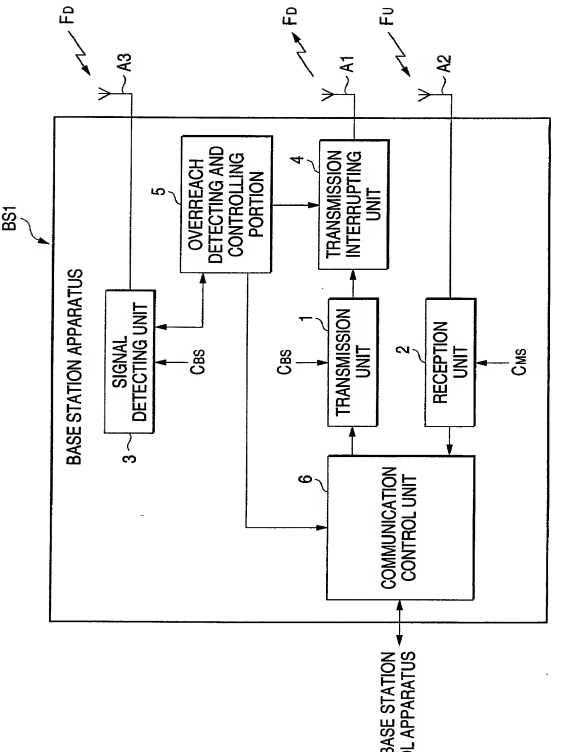
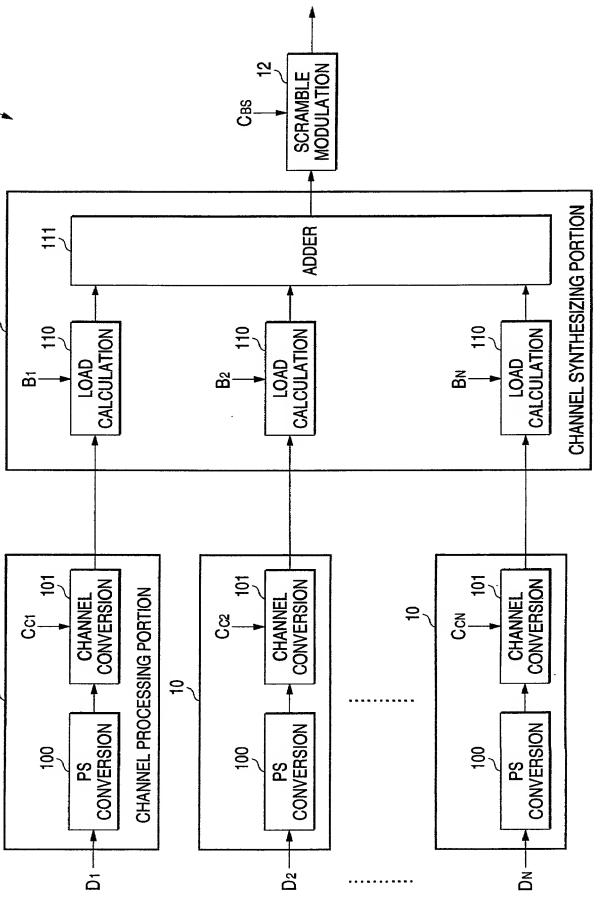
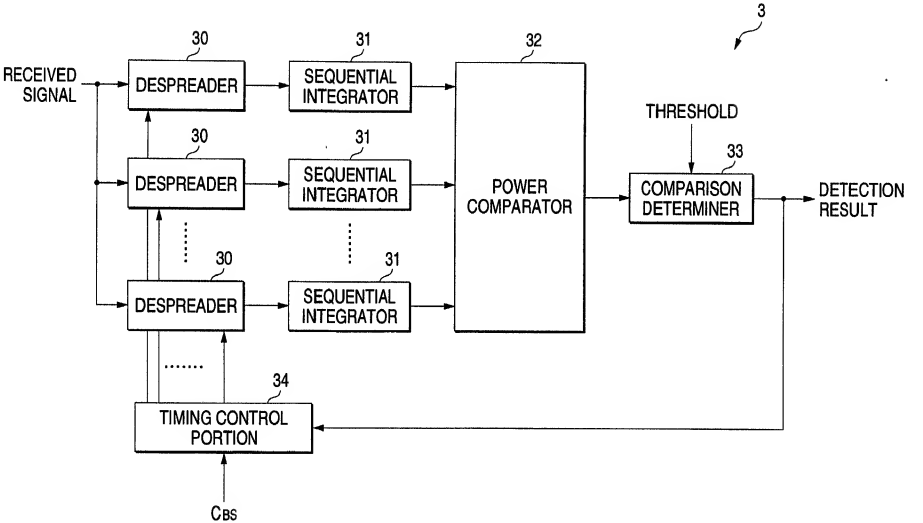

BS1
BASE STATION APPARATUS
SIGNAL DETECTING UNIT
3
CBS
OVERREACH DETECTING AND CONTROLLING PORTION
5
4
TRANSMISSION INTERRUPTING UNIT
CBS
1
TRANSMISSION UNIT
2
RECEPTION UNIT
CMS
6
COMMUNICATION CONTROL UNIT
TO BASE STATION CONTROL APPARATUS
FD
A3
FD
A1
FU
A2

FIG. 3


1
10
100
PS CONVERSION
101
CHANNEL CONVERSION
CC1
CC2
CCN
CHANNEL PROCESSING PORTION
D1
D2
DN
11
B1
B2
BN
110
LOAD CALCULATION
111
ADDER
CHANNEL SYNTHESIZING PORTION
CBS
12
SCRAMBLE MODULATION

FUBESD 3M3E0000

FIG. 4



OBLON, SPIVAK, ET AL
DOCKET #:209489US2
INV: Michiaki TAKANO
SHEET 4 OF 13

FIG. 5

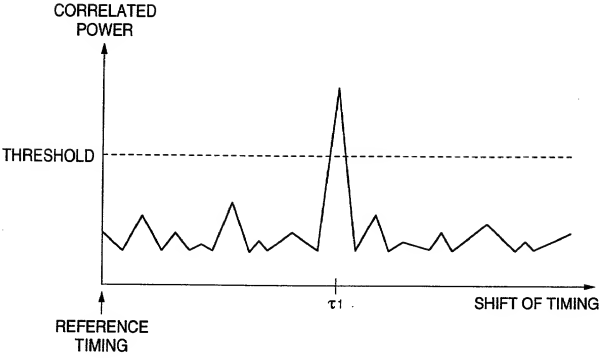

CORRELATED POWER
THRESHOLD
τ1
SHIFT OF TIMING
REFERENCE TIMING

FIG. 6

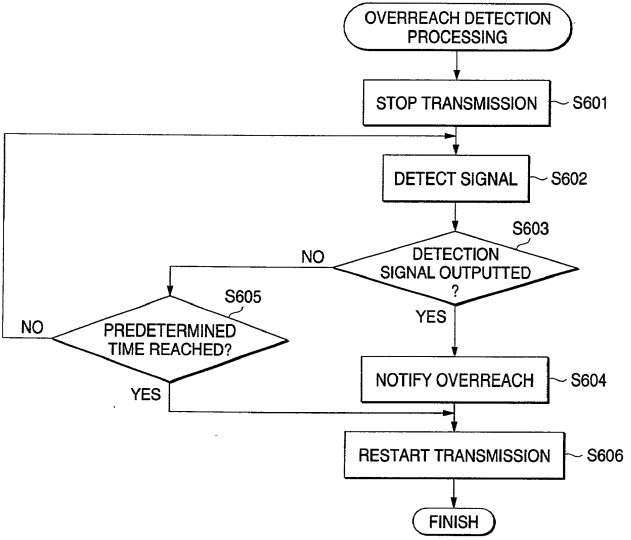
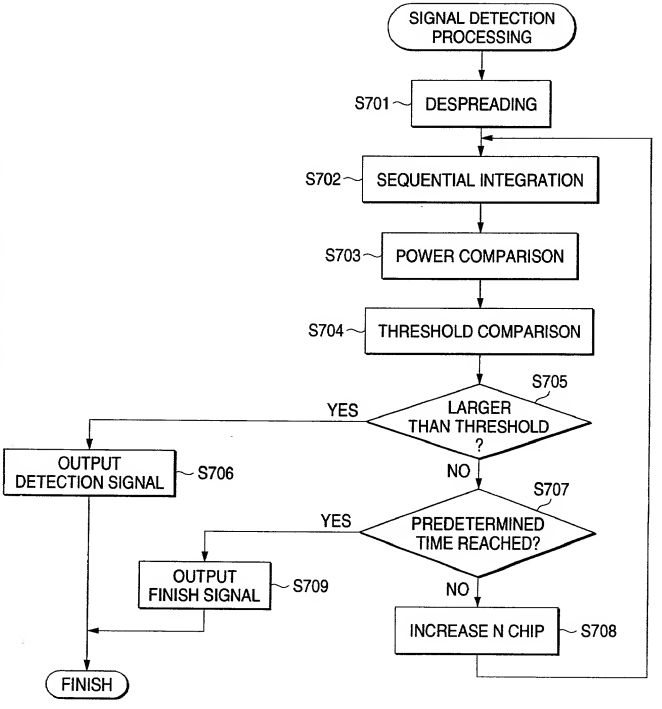
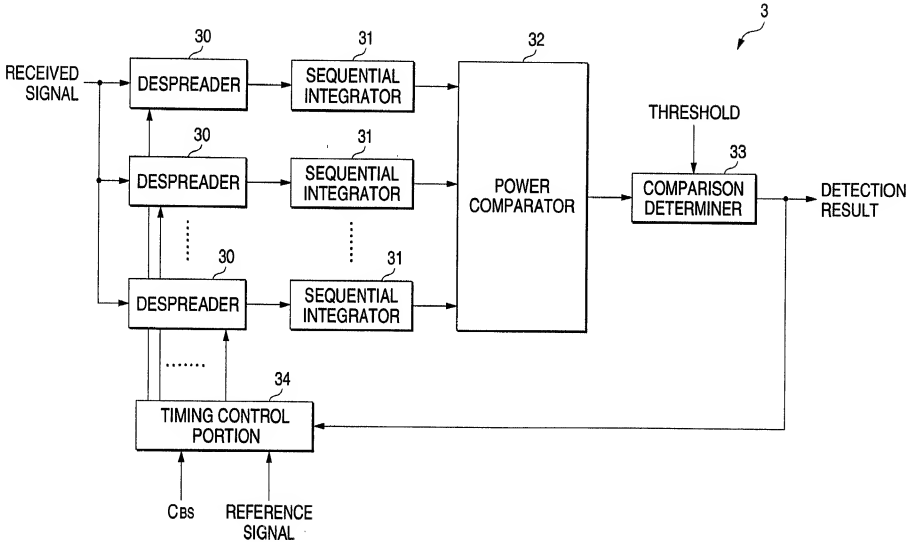

OVERREACH DETECTION PROCESSING
STOP TRANSMISSION
S601
DETECT SIGNAL
S602
S603
DETECTION SIGNAL OUTPUTTED ?
NO
YES
S605
PREDETERMINED TIME REACHED?
NO
YES
NOTIFY OVERREACH
S604
RESTART TRANSMISSION
S606
FINISH

FIG. 7


SIGNAL DETECTION PROCESSING
S701
DESPREADING
S702
SEQUENTIAL INTEGRATION
S703
POWER COMPARISON
S704
THRESHOLD COMPARISON
S705
LARGER THAN THRESHOLD ?
YES
NO
OUTPUT DETECTION SIGNAL
S706
S707
PREDETERMINED TIME REACHED?
YES
NO
OUTPUT FINISH SIGNAL
S709
INCREASE N CHIP
S708
FINISH

FUJESU 3032880

FIG. 8



OBLON, SPIVAK, ET AL
DOCKET #:209489US2
INV.: Michiaki TAKANO
SHEET 8 OF 13

FIG. 9

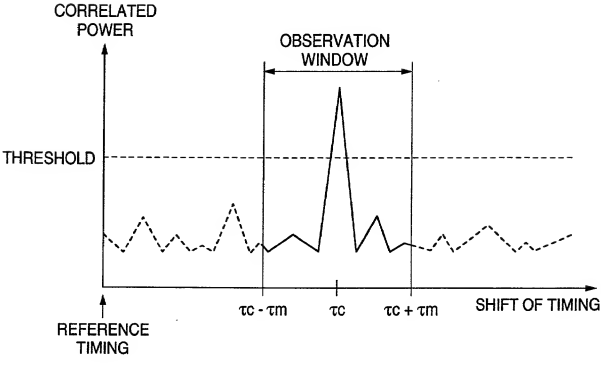

CORRELATED POWER
OBSERVATION WINDOW
THRESHOLD
τc - τm
τc
τc + τm
SHIFT OF TIMING
REFERENCE TIMING

FIG. 10

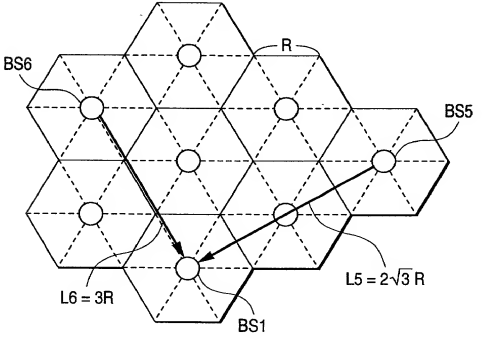

BS6
R
BS5
L5 = 2√3 R
L6 = 3R
BS1

FIG. 11

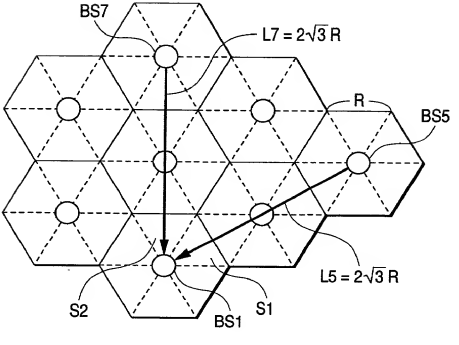


FIG. 12

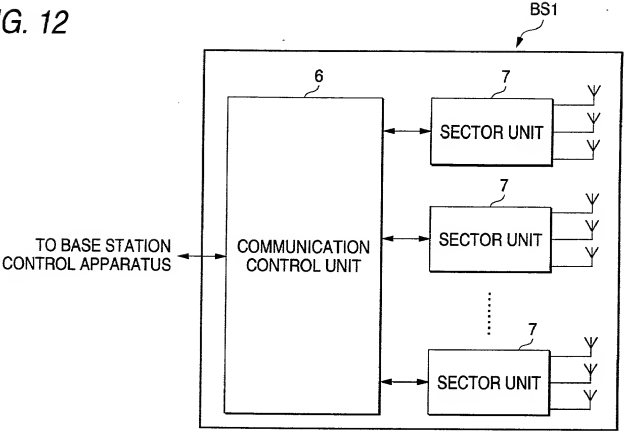

BS1
6
7
SECTOR UNIT
7
SECTOR UNIT
7
SECTOR UNIT
TO BASE STATION CONTROL APPARATUS
COMMUNICATION CONTROL UNIT

FIG. 13

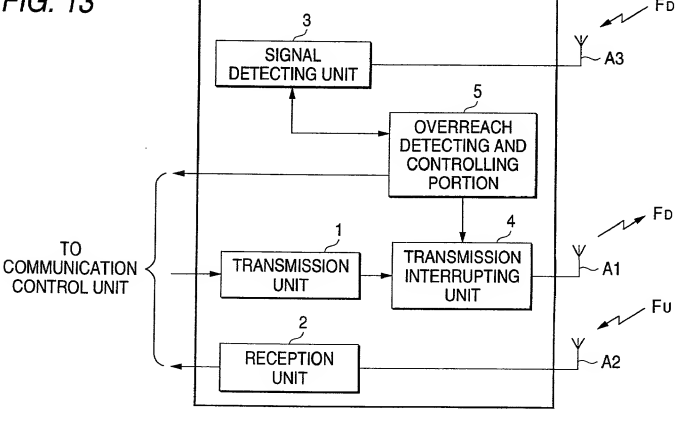

FD
3
SIGNAL DETECTING UNIT
A3
5
OVERREACH DETECTING AND CONTROLLING PORTION
FD
4
1
TO COMMUNICATION CONTROL UNIT
TRANSMISSION UNIT
TRANSMISSION INTERRUPTING UNIT
A1
FU
2
RECEPTION UNIT
A2

FIG. 14

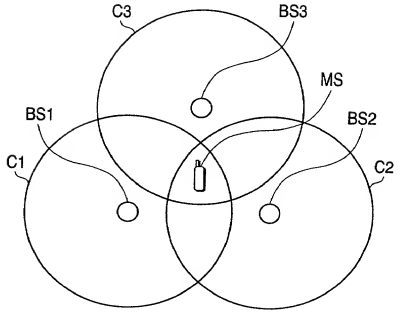

C3
BS3
MS
BS1
BS2
C1
C2

FIG. 15

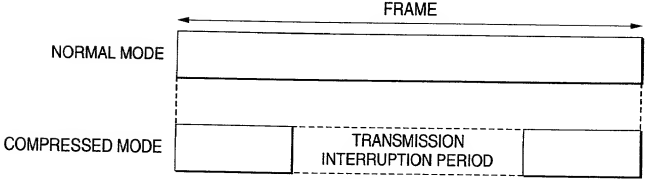

FRAME
NORMAL MODE
COMPRESSED MODE
TRANSMISSION
INTERRUPTION PERIOD

FIG. 16

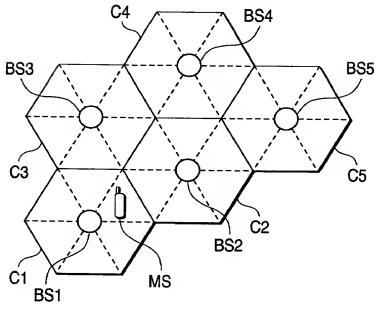


FIG. 17

DIRECTION \ CODE	SCRAMBLE CODE (LONG CODE)	CHANNELIZED CODE (SHORT CODE)
DOWN	BASE STATION IDENTIFICATION	CHANNEL IDENTIFICATION
UP	USER IDENTIFICATION	(CHANNEL IDENTIFICATION)